



Project Reference:

COLLEGES & UNIVERSITIES

Chevron Energy Solutions

University of Kansas

Lawrence, Kansas

Energy Performance Contract with UtilityVision®



Project Size: 85 buildings, 5.4 million sq ft

Project Value: \$18.4 million

Source of Funds: Tax Exempt Lease

Contract Terms: 18.5 years

Technical Design

Personnel: Tim Mense, Senior Project Manager, 913 563 3500
Doug Munnell, Project Manager, 913 563 3500
Randy Jameson, Project Manager, 913 563 3500
Vicky Watkins, Project Engineer, 913 563 3500
Chad Mestel, Project Engineer, 913 563 3500
Todd Einck, Energy Analyst, 913 563 3500

Project Schedule: In construction

| Project Phase | Project Dates | |
|-------------------------------|---------------|---------------|
| | Started | Completed |
| Comprehensive Energy Analysis | April 2002 | December 2002 |
| Design/Implementation | December 2002 | June 2004 |
| Monitoring | June 2004 | December 2022 |

Guaranteed Annual Energy Savings: Year 1: \$1,606,000 energy

Annual Non-Energy Savings: Year 1: \$103,000 – O&M (escalated by 3% annually)

Achieved Summarized Savings:

| Baselines | kWh | kW | CCF | Water (gal) | Steam (lbs) | Energy \$ | Non-Energy \$ | Total Dollars* |
|----------------|-----|----|-----|-------------|-------------|-----------|---------------|----------------|
| ANNUAL SAVINGS | | | | | | | | |
| Year | kWh | kW | CCF | Water (gal) | Steam (lbs) | Energy \$ | Non-Energy \$ | Total Dollars* |
| Construction | | | | | | | | |
| 1 | | | | | | | | |

* Energy Savings + Non-Energy Savings = Total Annual Dollars Saved

Measurement and Verification: Combination of Option A, C and stipulated.

Comments: Currently in construction.

List of Improvements:

- Boiler plant renovation
- Condensate return and steam tunnel renovations
- Electrical distribution
- Expand central chiller plant distribution
- Replace chillers
- New roof top and condensing units
- Building automated control systems
- Solar window film
- Attic insulation
- Refurbish cooling towers and add basin heater
- Replace cooling towers
- Variable frequency fan & pump drives
- Power factor correction
- UtilityVision® utility monitoring system
- Lighting renovations
- Domestic and process water conservation

Reference:

Mr. Jim Long, Vice Provost
University of Kansas
223 Strong
Lawrence, KS 66045
Tel 785 864 4705
Fax 785 864 4463
Email jlong@ku.edu